#### § 192.221

and the over-pressure protective device inoperative.

[35 FR 13257, Aug. 19, 1970, as amended by Amdt. 192–78, 61 FR 28784, June 6, 1996; Amdt. 192–85, 63 FR 37503, July 13, 1998]

# Subpart E—Welding of Steel in Pipelines

### §192.221 Scope.

- (a) This subpart prescribes minimum requirements for welding steel materials in pipelines.
- (b) This subpart does not apply to welding that occurs during the manufacture of steel pipe or steel pipeline components.

#### §192.225 Welding-General.

- (a) Welding must be performed by a qualified welder in accordance with welding procedures qualified to produce welds meeting the requirements of this subpart. The quality of the test welds used to qualify the procedure shall be determined by destructive testing.
- (b) Each welding procedure must be recorded in detail, including the results of the qualifying tests. This record must be retained and followed whenever the procedure is used.

[Amdt. 192-52, 51 FR 20297, June 4, 1986]

## § 192.227 Qualification of welders.

- (a) Except as provided in paragraph (b) of this section, each welder must be qualified in accordance with section 3 of API Standard 1104 or section IX of the ASME Boiler and Pressure Vessel Code. However, a welder qualified under an earlier edition than listed in appendix A may weld but may not requalify under that earlier edition.
- (b) A welder may qualify to perform welding on pipe to be operated at a pressure that produces a hoop stress of less than 20 percent of SMYS by performing an acceptable test weld, for the process to be used, under the test set forth in section I of Appendix C of this part. Each welder who is to make a welded service line connection to a main must first perform an acceptable test weld under section II of Appendix

C of this part as a requirement of the qualifying test.

[35 FR 13257, Aug. 19, 1970, as amended by Amdt. 192–43, 47 FR 46851, Oct. 21, 1982; Amdt. 192–52, 51 FR 20297, June 4, 1986; Amdt. 192–78, 61 FR 28784, June 6, 1996]

#### § 192.229 Limitations on welders.

- (a) No welder whose qualification is based on nondestructive testing may weld compressor station pipe and components.
- (b) No welder may weld with a particular welding process unless, within the preceding 6 calendar months, he has engaged in welding with that process.
- (c) A welder qualified under § 192.227(a)—
- (1) May not weld on pipe to be operated at a pressure that produces a hoop stress of 20 percent or more of SMYS unless within the preceding 6 calendar months the welder has had one weld tested and found acceptable under section 3 or 6 of API Standard 1104, except that a welder qualified under an earlier edition previously listed in Appendix A of this part may weld but may not requalify under that earlier edition; and
- (2) May not weld on pipe to be operated at a pressure that produces a hoop stress of less than 20 percent of SMYS unless the welder is tested in accordance with paragraph (c)(1) of this section or requalifies under paragraph (d)(1) or (d)(2) of this section.
- (d) A welder qualified under §192.227(b) may not weld unless—
- (1) Within the preceding 15 calendar months, but at least once each calendar year, the welder has requalified under § 192.227(b); or
- (2) Within the preceding  $7\frac{1}{2}$  calendar months, but at least twice each calendar year, the welder has had—
- (i) A production weld cut out, tested, and found acceptable in accordance with the qualifying test; or
- (ii) For welders who work only on service lines 2 inches (51 millimeters) or smaller in diameter, two sample welds tested and found acceptable in accordance with the test in section III of Appendix C of this part.

[35 FR 13257, Aug. 19, 1970, as amended by Amdt. 192–37, 46 FR 10159, Feb. 2, 1981; Amdt. 192–78, 61 FR 28784, June 6, 1996; Amdt. 192–85, 63 FR 37503, July 13, 1998]